

3/21/13 version

4/18/13 East Liverpool Ohio Public Meeting

Since 2009 the USEPA Regional Applied Research Effort (RARE) program has funded study of exposure to and health effects of airborne manganese (Mn) in Ohio adults. Following a decade of community interest and concern, residents of Marietta, Mt. Vernon and East Liverpool Ohio were studied via neurologic and neuropsychological tests, questionnaires and biological sampling. Results from Marietta (near a large industrial airborne Mn source) and Mt. Vernon (without large industrial airborne Mn sources) were published in 2011 and 2012 in the professional literature. In late 2012-early 2013 USEPA extended this work through a contract with San Francisco State University (SFSU; Rosemarie Bowler, principal investigator) to compare and combine Marietta and Mt. Vernon results with those from East Liverpool where another large airborne Mn source is located. R5 ATSDR, Ohio EPA, Ohio Department of Health, USEPA-ORD, SFSU, USEPA R5 Public Affairs and USEPA R5 ARD are preparing combined results from all three Ohio towns for presentation at an April 18, 2013 East Liverpool public meeting.

Study results generally indicate subtle but adverse nervous system effects in East Liverpool and Marietta. Effects were observed more frequently in East Liverpool, where airborne Mn concentrations were higher and residences closer to the Mn source. Related state and federal monitoring, enforcement and regulatory activities are ongoing.